



Docket No.: 2964-0102P  
(PATENT)

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re Patent Application of:  
Rolf SKÖLD

Application No.: 09/381,828

Confirmation No.: 004478

Filed: November 24, 1999

Art Unit: 1743

For: THE CHARACTERISATION OF PHYSICAL  
AND CHEMICAL PROPERTIES OF A LIQUID  
AND A DEVICE THEREFOR

Examiner: A. Soderquist

**DECLARATION UNDER 37 C.F.R. § 1.132**

MS Amendment  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

I, Rolf Sköld, do declare and say as follows:

1. I am a graduate of Lund University, Faculty of Technology in Lund, Sweden. I received my MSc in Chemical Engineering in 1973 and finalized my PhD studies with a doctoral degree in physical chemistry (thermochemistry) in 1976 at the same university. I held a post doctoral position at the University of Colorado at Boulder in 1976-1977.
2. I reside at Dragonvägen 11, SE-444 41 Stenungsund, Sweden.
3. I am listed as the inventor of the subject of the above-identified application, and I have read and understand the application.
4. The patent subject instrument and method is being developed commercially and a null series of apparatuses has been produced. Actual marketing has not yet been initiated, but as a result of interactions with the research community, three instruments have already been placed with major industrial corporations (Procter & Gamble Technical Centres Ltd, PO Box 135, Cobalt Business Park, Silver Fox Way, Newcastle Upon Tyne, NE27 0QW, England and Akzo Nobel Surfactants AB, SE-444 85 Stenungsund, Sweden) and one research institute (YKI, Surface Chemistry Institute, Drottning Kristinas väg 45,

DRA/ETP

SE-114 28 Stockholm, Sweden). The industrial users have purchased the instrument, while YKI has the instrument on leasing terms.

5. The declared reasons for the early acquisition of the instrument by the present users are directly related to the present invention, since the principally valued features are:

- the possibility to scan liquid formulation properties, as expressed by the electronically gathered values of the dependable parameters, over extensive temperature and composition ranges with a minimum of labor effort and cost;
- the ready access to physical and chemical data over an extensive range of temperatures and concentrations gives rapid indications regarding temperature-concentration ranges of particular interest for further studies, which may and may not involve complementary instrumental techniques;
- the possibility to visualize data in three dimensional graphs adds to the ease and speed of data examination and information transfer;
- the possibility to quantitatively identify critical transition concentrations and temperatures and other characteristics on an extensive temperature-composition surface simultaneously in the same vessel. The fact that observed physical and chemical phenomena often are reflected by more than one measured parameter adds synergistically to the informative value;
- the possibility to get access to valuable data at various temperatures and concentrations without a need to drain the vessel between changes in temperatures and/or concentrations. This feature reduces experimental time, minimizes operator and environmental exposure to hazardous compounds and saves scarce or expensive experimental material;

6. I hereby declare that all statements made herein of my own knowledge are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Date: 8 February 2006

By



Rolf Sköld  
Professor, CEO Scanalys AB